Rutgers, the State University of New Jersey
School of Public Affairs and Administration
Applied Statistics

Time: 06:00-09:30PM (TR) at ENG 311
Office: CPS-324   Instructor: Jongmin Shon
Office Hours: 04:00-05:00 (TR)   E-mail: jmshon@rutgers.edu

NOTE: This syllabus is a draft and is subject to change.

Course Description

This course provides students an opportunity to develop quantitative analysis skills that can be applied to public management and policy problems, program evaluations, and critical research questions. We will emphasize application of statistical techniques, interpretation of statistical results, the use of statistics in management decision-making, and implementation of statistical tools using computer software. We will make judicious use of mathematics and statistical theory. In this course, you will learn how data helps us make decisions using math to describe data and assess causal relationships. I will post essential course materials, and make announcements for courses on Blackboard (http://blackboardinfo.newark.rutgers.edu/). You had better access to Blackboard, and check your e-mail daily. I will not accept your excuse that I have not received e-mails and/or seen announcements. It is your responsibility for Blackboard.

Textbook

Required: Meier, K.J., Brudney, J. and Bothe, J. 2014. Applied Statistics for Public and
          Nonprofit Administration (9th ed). Cengage Learning.

Requirements

You must be able to access MS Excel and STATA at classroom and at home. But you are not allowed to use any other electronic devices (i.e. cell phone and internet) in class. How to access STATA at home is shown at the end of this syllabus.

Evaluation

Attendance (10%): I will check your attendance by homework/quizzes. Homework and quizzes will be given to you every week, and homework and quizzes will confirm your attendance. I will not give any extra chance except for your missing allowed by University Policy.

Homework & Quizzes (50%): I will give homework/quizzes every week. This helps you to prepare your exams. You cannot use any materials for quizzes except for a regular calculator. You should arrive at class on time; otherwise, you will miss quiz (traffic is not an excuse). Remember "NO MAKE-UP FOR HOMEWORK & QUIZ." You are not allowed to use any

other materials except for a regular calculator.

Final exam (40%): Because of the short schedule in the summer, you have only final exam that covers all the chapters on Aug 10. You can only use a regular calculator (not cell phone calculator). The details will be provided in the class before exams.

Grading Summary
A : 90 or above
B+: 85 - <90
B : 80 - <85
C+: 75 - <80
C : 70 - <75
F : Below 70

Policies
This class follows "Rutgers University Academic Integrity Policy" retrieved at
http://academicintegrity.rutgers.edu/academic-integrity-at-rutgers.

Course Schedule (subject to change)

Wk	Date	Topic	Reading
1	May 31	Introduction to statistics	Ch 1
2	June 7	Study design, sampling and data	Ch 2-3
3	June 14	Measurement of center and dispersion	Ch 4-6
4	June 21	Probability theory & distribution	Ch 7-9
5	June 28	Hypothesis testing	Ch 10-11
6	July 5	Hypothesis testing / T-test & ANOVA	Ch 11-13
7	July 12	T-test & ANOVA	Ch 13
8	July 19	Measures of association & chi-square	Ch 14-16
9	July 26	Regression analysis I	Ch 17-21
10	Aug. 2	Regression analysis II	Ch 17-21
11	Aug. 9	Final exam	